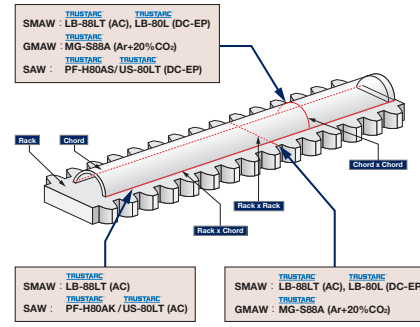


海洋構造物の溶接材料

Welding Consumables for Offshore Structures



Jack-up rig の溶接箇所
Welding parts of Jack-up rig

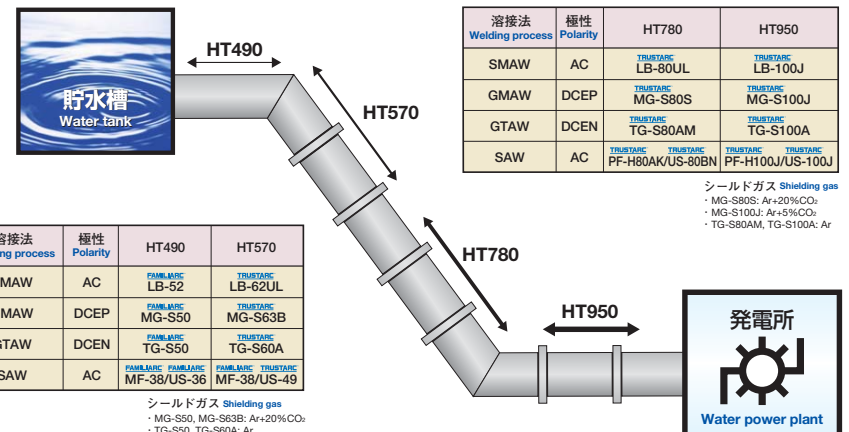
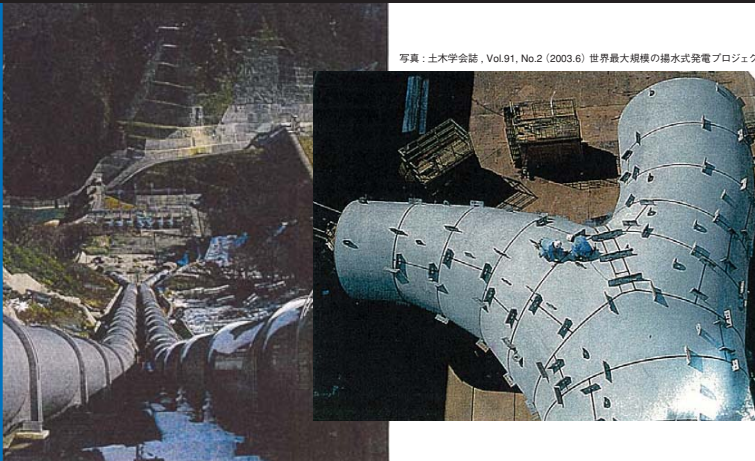


AWS 規格および機械的性質の一例
AWS classification and example of mechanical properties

Welding process	Welding consumable	AWS classification	YS level (MPa)	σ _E Temp ≥ 27J (°C)			CTOC _{Temp ≥ 0.25mm} (°C)			Note
				-20	-40	-60	-20	-40	-60	
SMAW	TRUSTARC LB-52NS	A5.5 E7016-G	400	■	■	■	■	■	■	AC Power
SAW	TRUSTARC PF-H58LT/US-36	A5.17 F7A8-EH14, F7P8-EH14	400	■	■	■	■	■	■	AC Power
GMAW	TRUSTARC MG-S50LT	A5.18 ER70S-G	400	■	■	■	■	■	■	Ar+20%CO ₂ shielding gas
FCAW	TRUSTARC DW-55L	A5.29 E81T1-K2C	400	■	■	■	■	■	■	CO ₂ shielding gas
	TRUSTARC DW-55LSR	A5.29 E81T1-K2C	420	■	■	■	■	■	■	
SMAW	TRUSTARC LB-80LT	A5.5 E11016-G	700	■	■	■	■	■	■	AC Power
SAW	TRUSTARC PF-H80AK/US-80LT	A5.23 F12A10-EG-G	700	■	■	■	■	■	■	AC Power
	TRUSTARC PF-H80AS/US-80LT	A5.23 F11A10-EG-G	700	■	■	■	■	■	■	DC-EP Power
GMAW	TRUSTARC MG-S88A	A5.28 ER120S-G	700	■	■	■	■	■	■	Ar+20%CO ₂ shielding gas

ペンストックの溶接材料

Welding Consumables for Penstocks



溶接法 Welding process	極性 Polarity	HT490	HT570
SMAW	AC	TRUSTARC LB-52	TRUSTARC LB-52UL
GMAW	DCEP	TRUSTARC MG-S50	TRUSTARC MG-S63B
GTAW	DCEN	TRUSTARC TG-S50	TRUSTARC TG-S60A
SAW	AC	TRUSTARC MF-38/US-36	TRUSTARC MF-38/US-49

溶接法 Welding process	極性 Polarity	HT780	HT950
SMAW	AC	TRUSTARC LB-80UL	TRUSTARC LB-100J
GMAW	DCEP	TRUSTARC MG-S80S	TRUSTARC MG-S100J
GTAW	DCEN	TRUSTARC TG-S80AM	TRUSTARC TG-S100A
SAW	AC	TRUSTARC PF-H80AK/US-80BN	TRUSTARC PF-H100J/US-100J

シールドガス Shielding gas
 ・ MG-S80S: Ar+20%CO₂
 ・ MG-S100J: Ar+5%CO₂
 ・ TG-S80AM, TG-S100A: Ar

シールドガス Shielding gas
 ・ MG-S50, MG-S63B: Ar+20%CO₂
 ・ TG-S50, TG-S60A: Ar